



E ISSN 2350-0204

# IJAPC

VOLUME 11 ISSUE 3 2019

[www.ijapc.com](http://www.ijapc.com)

Greentree Group Publishers (GGP))



## Literary Review of *Tamaka Shwas* and Its Management with Reference to Bronchial Asthma

Roktima Rabha<sup>1\*</sup> and Dipankar Saha<sup>2</sup>

<sup>1</sup>Department of Kayachikitsa, Govt. Ayurvedic College, Guwahati, Assam, India

<sup>2</sup>Department of Samhita and Siddhanta, Govt. Ayurvedic College, Guwahati, Assam, India

### ABSTRACT

*Tamaka shwas* is a very common disease in India. The prevalence of the disease is increasing day by day due to genetic susceptibility, pollution, seasonal changes, environmental factor, drugs, smokepollen, house dust, mite etc. Air pollution, over crowding, industrialization, *stressfull* life, unusual food stuffs and abnormal food style that all exposes the humans to suffer from *tamakaswas*. It affects the people of both sexes and it may occur at any age. It is a serious health problem in almost all developing country. *Tamakaswasa* can be correlated with the disease bronchial asthma in modern science on the basis of its clinical features and *etiopathogenesis*.

Bronchial asthma is a chronic inflammatory disorder of the airway. In susceptible individuals these inflammations cause recurrent episode of wheezing breathlessness, chest tightness, and *coughing*. These episode are usually associated with widespread but variable airflow obstruction that are often reversible either spontaneously or with treatment.

In modern science, bronchial asthma is managed by bronchodilator such as beta agonist, anti-cholinergics, and xanthenes are used for sytomatic relief but these drugs cause unwanted side effect.

So Ayurveda suggests various preventive measures which serves a healthy life and save outcome. Various drugs are discussed in Ayurvedic classics that are important for altering the current lifestyle of human being.

### KEYWORDS

*Tamakashwas, Bronchial asthma, Chronic inflammatory disorder*



**Greentree Group Publishers**

[Received 26/08/19](#) [Accepted 14/10/19](#) [Published 10/11/19](#)



## INTRODUCTION

Acharya Charaka suggests various etiological factors, with variable multiplicity of environmental, dietetic and seasonal factors etc, and which leads to inflammation of the bronchioles and cause breathing difficulty etc.

*Tamaka swas* is a chronic disorder of *pranavaha srota*. It is predominantly a *vatakapahaja vyadhi* originating from *pittasthana*. *Vata* gets obstructed by *kapha* and travels into *pratilomagati* and in turn cause *swasa*, that disturbs the daily activity of life. According to *ayurveda* there are five types of *shwasroga* and *Tamakashwas* is one of the type of *shwasaroga*.

### Incidence

*Tamaka swas* which is affecting approximately 300 million people globally with 250,000 annual deaths. The prevalence of asthma has risen in economically rich countries over the last 30 years, with 10 – 12 % of adult and 15% of children are affected by the disease. According to WHO estimations, there are 300 million people of different ages and ethnic background suffering from asthma.

### DESCRIPTION OF SHWAS ROGA:

#### Site of origin:

*Hikka* and *Shwas* have been described together in the same chapter by *Caraka* because of their clinical identity, similar

pathogenesis and site of origin. Both *shwas* and *Hikka* are caused by aggravation of both *kapha* and *vata* and originate from the *pitta sthan*, they affect the *hridaya* and causes *sosana* of all the *dhatu*s situated there. Thus these two diseases have common pathogenesis and are difficult to cure. Also, if any of these diseases is neglected and not treated properly at proper time or if the patient indulges in unwholesome regimens, then they may exacerbate and affect the body like snake venom<sup>1</sup>.

#### Types of swasa<sup>2</sup>:

There are 5 types of *shwas* mentioned in the classics of *Ayurveda* as follows –

- A. *Maha Shwaa*
- B. *Urdhva Shwas*
- C. *Chinna Shwas*
- D. *Ksudra Shwas*
- E. *Tamak shwas*

#### A. *Maha Shwas*<sup>3</sup>:

This condition is caused by the disturbance of movement of *vayu* in the respiratory tract. The patient breathe incessantly with a loud and long stator like an intoxicated bull. He losses all the sense of knowledge and understanding, his eyes are restless, his face gets distorted, his urine and *faeces* gets constipated, his voice is weakened and his intensely hurried breathing is noticeable even from a distance. This condition is



called *Mahaswasa* and a patient suffering from *mahashwas* dies immediately.

#### **B. Urdhava Shwas :**

Under this condition the expiratory phase is prolonged. Mouth and the respiratory tract gets obstructed with *kapha*. In *urdhava shwas* the patient eyes are turned upwards, he is almost oblivious to his surroundings, and also his eyes become restless. The patient gets afflicted with severe pain and enters into stupor having provoked expiratory process and obstruction in inspiration. The patient suffers from delusion and senselessness. Such condition of expiratory dyspnoea soon takes away the patient's life.

#### **C. Chinna Shwas:**

In this condition, the patient being afflicted with interruptions or cessation of breathe. He is afflicted with constipation, sweats and fainting, burning and retention of urine. His eyes are filled with tears, he is greatly emaciated, while struggling for breathe his eyes becomes excessively injected and he become unconscious, along with dryness in mouth .

#### **D. Ksudra Shwas:**

Because of the vitiation of *vayu* in the alimentary tract minor dyspnoea occurs. This condition does not give pain and do not interfere in the course of food and drinking. It does not disturb the sensory organs. This condition mainly occurs as a

result of excessive intake of *ruksha* (*ununctuous*) eatables and excessive physical exercise<sup>3</sup>.

#### **E. TamakaShwas:**

*Vata* moving in reverse order, prevade the channels of *srotas*, afflicts both neck and head, and also stimulates *slesma* which cause *peen*s. *Vayu* being obstructed by *slesma*, produces a variety of dyspnoea associated with *ghurghurakasabda* (wheezing) and which is *pranapeedaka* (painful). Due to acute paroxysmal dyspnoea, patient becomes sad, coughs and gets fainted due to constant coughing. Due to inability to expectorate, the patient becomes restless and once the sputum being expectorated he feels comfort for a while.

The patients cannot sleep because *vata* presses upon both his *parsva* (sides) while lying flat on bed. Patients feels comfort in sitting or propped up position. He likes to take warm things. Patient's eyes are swollen; forehead is covered with sweat and feels distressed all the times.

*Tamakashwas* of two types-

a. *Pratamakshwas*

b. *Santamak shwas*

#### **Pratamak shwas:**

When a patient is suffering from *tamakashwas*, and gets afflicted with fever and fainting, then the condition is called *Pratamakashwas*. This is marked by *udavarta* (upward movement of *vayu* in



abdomen), raja (inhalation of dust), *ajeerna* (indigestion), *vridhavastha* (old age) & *kaya nirodh* (suppression of natural urges). It gets aggravated in darkness (at night) and gets alleviated instantaneously by cooling regimens.

If such a patient feels as if he is being submerged in darkness, then this condition is called a *Santamaka shwas*

In *Astanga samgrah* only *pratamak shwas* is mentioned where association of *jwar* and *murcha* with *shwas* is mentioned<sup>4</sup>.

#### **Nidana of Shwas<sup>5</sup>:**

- i. Exposure to dust, smoke and wind.
- ii. Residing in cold place and use of cold water.
- iii. Exercise, sexual intercourse and long walking beyond capacity.
- iv. Habitual intake of unctuous food.
- v. Intake of food deficient or excessive in quantity and before or long after the meal time.
- vi. Vitiating of *āma*, use of contradictory ingredients.
- vii. Habitual intake of *nispāva*, black gram, oil-cake, sesame oil.
- viii. Intake of pastry, *sāluka*, wind-forming ingredients, *vidāhi* and heavy food.
- ix. Intake of meat of aquatic and marshy animals & birds.
- x. Intake of curd and *unboiled* milk, *abhisynadhi* and *kapha* aggravating diets.

Injuring to the chest and different types of obstruction to the channels of circulation

#### **Purvarupa (Prodromal Symptoms)<sup>6</sup>:**

The *purvarupa* (prodromal symptoms) described by authorities are as follows:-

1	<i>Anaha</i>	Constipation
2	<i>Parsva shula</i>	Pain in chest
3	<i>Hridya perana</i>	Precordial pain
4	<i>Prana vilomata</i>	Short and shallow breathing
5	<i>Bhakta dwesa</i>	Disinclination towards food
6	<i>Arati</i>	Restlessness
7	<i>Vairasya</i>	Bad taste in mouth
8	<i>Sankhabheda</i>	Headache

#### **Samprapti (Pathogenesis)**

In *carak samhita Hikka* and *Shwas vyadhi* are mentioned in one chapter due to the similarities of each other. Acharya Caraka has furnished the *samprapti* of *shwas* as-A common *samprapti* for all types of *shwasroga* has been described. Here *vata* associated with *kapha*, obstructs the air passages, the airflow within and without is obstructed, leading to clinical manifestations of *Shwas*. *Cakrapani* has commented that the obstruction is both at the level of *pranavaha* as well as *udakavahasrotas*. Of course it is to point out that along with the respiratory difficulty, there is also derangement in the circulation of liquids i.e. *rasa*, *udaka* being the chief constituent of *rasa*.

*Caraka* has elaborated a special *samprapti* for *tamakashwas* where he mentioned that *vayu* becomes *pratiloma* (opposite in its



course), pervade the *pranavahasrotas* which produces stiffness in the region of neck and head and also stimulate *kapha*, and which gives rise to *peenas*. Thereafter as *vayu* get obstructed by the stimulated *kapha*, it produces *shwas* in association with a *ghurghursabda* (wheezing and rhonchi on auscultation)<sup>7</sup>.

#### **Sahya Asadhyata (Prognosis)<sup>8</sup>:**

1. *Maha swas, urdhwa swas and china swas - Asadhya*
2. *Tamaka swas*  
-*Sadhya in avyakta stage*  
-*Krichhsadhya in jirna stage*  
-*Asadhya in durbala patients (Susruta)*
3. *Khsudra swas- sadhya*

#### **INVESTIGATIONS:**

The laboratory diagnostics procedures includes -

##### ➤ Pulmonary Function Test (PFT):

The guidelines for PFT were recently carried out by Association of Respiratory Technician and Physiologists (ARTP). The main functions which can be done includes:

- Lung Volume
- Diffusion Capacity
- Expiratory Flow Rates and
- Bronchodilator Response

The expiratory flow may be assessed by *spiograms* or by electronic device micro spirometer.

- Blood Examination:
- Total Leucocytes Count.
- Absolute Eosinophil Count.
- ESR

➤ Serum Creatinine Phosphokinase (CPK) .

➤ Examination of Sputum:

➤ Radiological Examination:

➤ Arterial Blood Gases Estimation:

#### **Complications of bronchial asthma:**

1. Acute severe asthma
2. Recurrent bronchitis and pneumonia (from infectious)
3. Atelectasis (collapse) of lung or bronchiectasis (from mucous plugs)
4. Emphysema
5. Pneumothorax (spontaneous)

Chronic *Cor Pulmonale* and Respiratory Failure (in late stage)

#### **Chikitsa (Principles of treatment)<sup>9</sup>**

*Nidanaparivarjana* is the first line of treatment

*Caraka* has described the approach to the patient afflicted with *Hikka* and *shwas* as – in the beginning they should be anointed with oil (unctuous substance) mixed with salt and then sudation by *nadi sweda*, *prastara sweda* and *sankarasweda*. This process causes *kaphavilayana* (liquification of *kapha dosha*), *srotamardava* (softness of channels) and *vatanulomana* (recourses *vata* in proper direction) thus relieving the patient.

After ascertaining that the patient is properly fomented, patient should then be given emetic therapy, mixed with *pippali*, *saindhavalavana* and honey. Care should



be taken to ensure that no *vata* aggravating ingredients are added to the recipe.

*Charaka* also discussed about the patients having good built i.e. *balwana* and those having the predominance of *kapha* should be treated with *sodhana* therapy like *vamana* and *virechana* and then after that *samana* therapy should be started.

The patients with poor built i.e. *durbala* and having the predominance of *vata* should not be treated with *sodhana* therapy. They should be treated with drugs having alleviated property of *vatadosha*. They should be kept on nourishing diet containing soup and fats. The children and old people should also be managed with *samana* therapy i.e. palliative therapy.<sup>7</sup>

The channels of *vayu* should always be cleansed by the administration of *sodhana* therapies for the elimination of obstructing dosas.

#### ***Samsodhana Cikitsa*<sup>10</sup>:**

As the *shwasroga* occurs from aggravation of *prana vayu*, caused by hindrance to its movement by obstruction from *kapha*, it is beneficial to prescribe *sodhana* of upward direction (*vamana*) and also of downward direction (*virechana*) to clear the channels.

#### ***Snehana* and *Swedana*<sup>10</sup>:**

The fomentation therapy renders the adhered *kapha* dissolved in the channel of circulation and softened thereby. These

therapies also cause downward movement of *vayu*.

*Caraka* further added some ailments or conditions which are not suitable for *swedana*(fomentation therapy). They are—*daha* (burning sensation), *pitta rogas* (diseases caused by *pitta*), *ati-rakta* (excessive bleeding), *ati-sweda* (excessive sweating), *ksinadhatubala* (Feebleness of tissue *elememts*), *ruksha* (dryness in excess), *garbhini* (pregnant woman) and *pittala* (*pitta prakriti* or constitution).

Such patients can be given mild *swedana* (fomentation) therapy for a moment in their *urah* (chest) and *kantha* (neck) by sprinkling *luke* warm oil (*sneha*) mixed with *sarkara*, and then, by applying *upanaha* and *utkarika*<sup>11</sup>.

#### **❖ *Vamana Karma*<sup>12</sup> :**

The patient should then be given emetic therapy, mixed with *pippali*, *saindhalavana* and honey to expel the *disita kapha* and clears the passage of *vata*. If the patients suffering from *shwas* gets afflicted with *kasa* or *svarabhanga* (hoarseness of voice), then they should be given emetic therapy with *vatakaphanasaka* drugs.

*Vagbhata* stated that after *swedana* (sudation), patient should be given mild *vamana* (emesis) especially when having *kasa* (cough), *vamathu* (vomiting), *hridgraha* (heart ailments), *swarasada*



(weakness of voice) using *pippali*, *saindhava* and honey or others (drugs) which are not antagonistic to *vata*.

#### ❖ **Virechana Karma**<sup>13</sup>:

*Virechana* is considered to be the most suitable therapy for *tamakashwas* because of the fact that the origin site of the disease is 'Pittasthana' and for pitta *virechana* is the best.

*Virechana* with *vata-kapha nasaka* drugs should be given especially in *tamakashwas*.

When there is *adhmana* (distension of abdomen), *udavarta* (upward movement of *vata*) and *tamaka* (dyspnoea), the patient should be given food along with *matulunga*, *amlavetasa*, *hingu*, *pilu* and *bida*, all mixed together. This will act as *anulomana* or even a *virechana* can be given along with *amla rasa phala* and *saindhava*.

#### ❖ **Dhumrapāna**:<sup>14</sup>

*Avarti* (elongated pill) is prepared with the paste of *haridra*, *patra*, *erandamula*, *laksa*, *manasila*, *devadaru*, *haritala* and *jaṭamamsi*. This *varti* is smeared with ghee and used for smoking.

According to *Susruta*, *dhumrapana* (inhalation of smoke) is to be given by making a *varti* in a usual way using *manasila*, *devadara*, *haridra*, *chandan* (*patra*), *amisa* (*guggulu*), *laksa* and root of *urubuka*. All the smoke inhalers should be done with the above materials mixed with ghee.

According to *Vagbhata*, even after *sodhana* therapies, if the disease does not subside then the residual *dosas* are to be subdued by the administration of *dhumra* with – Leaves of *haridra*, *erandamula*, *laksa*, *manasila*, *devadaru*, *ela*, *Agaru*, *chandan*, *Guggulu*, *sala niryasa orsallaki*, *guugulu*, *loha* and *padmaka* together soaked with ghee.

#### ❖ **Nasya Yogās: according to Vagbhata-**

➤ *Nasya* with *lasuna* or *palandu* or *grinjanaka*

➤ *Pippali* and *sarkara* or only *madhuka* along with honey

➤ *Madhu* mixed with sugar may be used as *nasya* warm or cold alternatively

#### **Śamana Cikitsa**<sup>15</sup>

The ingredients which cause alleviation of *vayu* and *kapha dosa*, which are *usna* (hot) in potency and which are *vatanulomana* (cause downward movement of *vayu*) are useful as medicines, drinks and food preparations for the patients suffering from *shwas*.

The ingredients which exclusively alleviate *kapha* but aggravate *vayu* or which exclusively alleviate *vayu* but aggravate *kapha* must never be used in the treatment of *Shwas*. Between these two categories of treatment, however, the latter category i.e. the administration of ingredients which alleviate *vayu* but may aggravate *kapha* can, if necessary, be used in exceptional circumstances.



The *shwasrogi* should generally be treated with *brmhana* (nourishing) therapy or *samana* (alleviating) therapy, irrespective of the fact whether he has undergone *sodhana* (purification) therapy or not. The *swasa rogi* should never be given *karsana* (depletion) therapy as it is likely to produce serious adverse effects which are difficult to cure.

*Vagbhata* is also of same view that *brmhana* should be resorted to in the treatment of *shwas* because there will be little risk of any adverse effect whereas in *karsana* the risk of adverse effect is great and they are incurable also.

Patient of *shwas* who also have *ksata-ksina*, *atisara*, *raktapitta*, *daha* as concurrent diseases should be treated with foods and drugs which are *madhura*, *snigdha* and *sheeta*.

Acharya *Caraka* has described ten drugs as *Shwashara Mahakasaya*. They are— *Sati*, *Puskarmula*, *Amlavetas*, *Elachi*, *Hingu*, *Tulsi*, *Agaru*, *Bhumyamlaki*, *Jivanti*, *Canda*.

## MANAGEMENT<sup>16</sup>

To reduce inflammation certain basic principles of bronchial asthma need to be considered before starting therapy.

➤ Treating the following conditions may improve asthma management - Allergic bronchopulmonary aspergillosis (ABPA), Gastroesophageal reflux, Obesity,

Obstructive sleep apnea (OSA), Rhinitis / Sinusitis, Chronic stress / depression.

➤ Allergic and non-allergic rhinitis should be treated with anti-histamines, *cromolyn* sodium nasal spray, or topical nasal steroids.

➤ The patient should avoid:

- Beta blockers (tablets and *eyedrops*)
- If aspirin or NSAIDs are known to induce asthma
- Allergens which is known to patients
- Occupational causes.
- Active and passive smoking.
- Prophylactic treatment for exercise or before exposure to triggers

## TREATMENT:

**Basically the treatment of asthma consists of both:**

- a) Non-pharmacologic therapy, and
- b) Pharmacologic therapy.

**Non-pharmacological treatment consists of:**

- (i) patient and family education, (ii) avoidance of agents that induce or trigger asthma, like allergens, irritants like smoke, and reasonable attempts at reducing exposure to respiratory viruses, and (iii) immunotherapy.

## Pharmacologic Management:

Medications to treat asthma can be classified as Controllers or Relievers. Controllers are medication taken daily on a



long term basis to keep asthma under clinical control. They include

- a. Inhaled and systemic *glucocorticosteroids*,
- b. *Leukotrienes* modifiers,
- c. Long-acting inhaled  $\beta$ 2-agonists (LABA) in combination with inhaled *glucocorticosteroids*,
- d. Sustained-release theophylline, *cromones*, and anti-IgE. Inhaled *glucocorticosteroids*.

Relievers are the medications used on an as needed basis that act quickly to reverse constriction and relieve its symptoms. They include

- a) Short acting inhaled  $\beta$ 2-agonists (SABA),
- b) Inhaled anti-*cholinergics*, short-acting theophylline, and
- c) Short-acting oral  $\beta$ 2-agonists.

## CONCLUSION

Bronchial asthma is a chronic inflammatory disorder of the airways which is associated with airway hyper responsiveness and leads to recurrent episodes of wheezing, breathlessness, chest tightness and coughing, particularly at night or in the early morning. The episodes are usually associated with airflow obstruction within the lungs which is often reversible either spontaneously or with treatment.

Various factors like changes of life style, environmental changes, population explosion, industrialization etc which act as triggering factor for *Tamaka shwas*. Therefore *nidanparivarjan* got primary role in the management of disease *Tamaka shwas*. In modern science, the pharmacological treatment includes systemic corticosteroids, *leukotrienes* modifiers, *immunomodulators*, LABA, SABA, *methylxantines* and *anti-cholinergics* etc. But all these drugs have limitations to act at various levels of disease along with side-effects. Therefore there is a need to find some other solutions. In Ayurvedic classics, our *Acharya* has discussed about thousand of medicine for *Tamaka swas* which could subside all the sign and symptom and the patient could live a better life.



## REFERENCES

1. CarakaSamhita (Text with English Translation &Critical Exposition based on CakrapaniDatta's Ayurveda Dipika, by R.K. Sharma, Bhagwaan Das, Ch .chi17/8-9.
2. SushrutaSamhita of MaharsiSushruta, edited with Ayurveda TattvaSandipika, Hindi Commentary by Kaviraja Ambika Dutta Shastri, Su ut .t 51/4.
3. Charaksamhita of Agnivesa revised by Charaka and Drihabala with introduction by Sri Satyanarayanshastri with elaborated hindi commentary by Pt.kasinathasastri, and Gorakhanathachaturvedi, Ch.chi 17/46-67.
4. Astanga sangrah of srimad Vagbhata edited with hindi commentary by Dr Brahmanand Tripathi, As.Sa.Ni 4/5.
5. CarakaSamhita (Text with English Translation &Critical Exposition based on CakrapaniDatta's Ayurveda Dipika), by R.K. Sharma, Bhagwaan Das,ch.chi.17/13-15.
6. CarakaSamhita (Text with English Translation &Critical Exposition based on CakrapaniDatta's Ayurveda Dipika), by R.K. Sharma, Bhagwaan Das, ch.chi 17/45.
7. CarakaSamhita (Text with English Translation &Critical Exposition based on CakrapaniDatta's Ayurveda Dipika), by R.K. Sharma, Bhagwaan Das ch.chi17/55.
8. SushrutaSamhita of MaharsiSushruta, edited with Ayurveda TattvaSandipika, Hindi Commentary by KavirajaAmbikaDuttaShastri, su .ut.51/14, su.utt.51/48.
9. Charak Samhita of Agnivesa, Vol. II by Dr. Brahmananda Tripathi, Ch .chi 17/138, ch.chi 17/75, ch.chi 17/88-90, ch chi 17/122, ch.chi 17/71-72.
10. Astanga hridayam of srimad Vagbhata edited with hindi commentary by Dr Brahmanand tripathi, A,H.chi 4/8 A.h.chi 4/1, A.h chi 4/58-59.
11. CarakaSamhita (Text with English Translation &Critical Exposition based on CakrapaniDatta's Ayurveda Dipika), by R.K. Sharma, Bhagwaan Das ch,chi 17/82-83.
12. Charaksamhita of Agnivesa revised by Charaka and Drihabala with introduction by Sri Satyanarayanshastri with elaborated hindi commentary by Pt.kasinathasastri,andGorakhanathachaturvedi, ch chi 17/74-76.
13. CarakaSamhita (Text with English Translation &Critical Exposition based on CakrapaniDatta's Ayurveda Dipika), by R.K. Sharma, Bhagwaan Das, ch chi 17/121.
14. CarakaSamhita (Text with English Translation & Critical Exposition based on CakrapaniDatta's Ayurveda Dipika), by



R.K. Sharma, Bhagwaan Das ch chi 17/77-78.

15. CarakaSamhita (Text with English Translation &Critical Exposition based on CakrapaniDatta's Ayurveda Dipika), by R.K. Sharma, Bhagwaan Das, Ch,chi 17/147-150.

16. A thesis work on “A Clinical Evaluation of Shwashar Mahakasaya in the Management of Tamak Shwas (bronchial asthma)” Govt. Ayurvedic College & Hospital, Ghy-14 by Dr Niten Barman on may 2016.